

RAW SEQUENCE LISTING

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Application Serial Number: 10/551,964
Source: PCT
Date Processed by STIC: 10/18/2005

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DATE: 10/18/2005

PATENT APPLICATION: US/10/551,964

TIME: 10:17:42

Input Set : A:\YP-US04017CT(711) SEQUENCE ver 2.txt
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3 <110> APPLICANT: Yamanouchi Pharmaceutical Co., Ltd.
 4 Keio University
 5 Yasunaga, Kunio
 6 Yamaji, Noboru
 7 Suda, Toshio
 8 Oike, Yuichi
 10 <120> TITLE OF INVENTION: Method of screening antiobesity agents and animal model of
 obesity
 12 <130> FILE REFERENCE: YK0417PCT711
 C--> 14 <140> CURRENT APPLICATION NUMBER: US/10/551,964
 C--> 14 <141> CURRENT FILING DATE: 2005-10-05
 14 <150> PRIOR APPLICATION NUMBER: JP 2003-163016
 15 <151> PRIOR FILING DATE: 2003-06-06
 17 <150> PRIOR APPLICATION NUMBER: JP 2004-111500
 18 <151> PRIOR FILING DATE: 2004-04-05
 20 <160> NUMBER OF SEQ ID NOS: 59
 22 <170> SOFTWARE: PatentIn version 3.1
 24 <210> SEQ ID NO: 1
 25 <211> LENGTH: 3028
 26 <212> TYPE: DNA
 27 <213> ORGANISM: Homo sapiens
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 39 ttataactg aagatgaaa ctaaagaagt ttctttctc tgtgtctggc cccatccctg 300
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 61 tggatagggtt tccgggtgtc aactgtgtgtt acctgttttgc tatctgtgca ctactgtgtg 960
 63 atcacaagaa ccaggatgtg gacaaggctg acacacagat aaagacccac tcagccacc 1020
 65 ccatttcctt ttaagtgtgt atgtgtgtt gaccatattt ggaacataca gttgtgcct 1080
 67 gaaactgtta tggttcagc tggtctttt taaaatttt tttaatcaa tgagatatcc 1140
 69 tttatattatg aaagcatagt tccaatgcag aagtcaagct ttatgggtat atattaggat 1200
 71 aggttcagat ccaatatgac aatgttttagc actaacttta acatgttaaa gctctgattc 1260
 73 ctgaatgttt ttctcactta atatattctc tccaatgaca agctgggtgtc cttggcttct 1320

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79	tacacacaca cacacacaca cacacacaca ccacacacac aaacaaaaca aaaaaaacac	1500
81	caaagaaaaga tagctatcac tgcatacatatg aatactgtcc aggtatcag atcaattatc	1560
83	aatccaaagg tctctgggtgt tttgtctcac agtggtaat atatgaatgc ttctcttatta	1620
85	tactgacttg tattatTTTC aacaaataat tatgtggact caaaatctta catttttatt	1680
87	tcttttcttt tttttttt ttttttggaa caggtctta ctctgtcGCC caggctggag	1740
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91	ctgagtagct gggattacag gcatggGCC ccacacccgg caaatTTTtG tatttttagt	1860
93	agagacgggg tttcaccatc ttggccaggc tggctcGaa ttgctgaccc cgtatctgc	1920
95	ccgccttggc ctcccaaagt gctgggattt caggcgtgag ccaccgcGCC cagccttaca	1980
97	tttttatttc taattataaa atccagatTTT atccaaaaaa cataaatcac atgttaactga	2040
99	ggtagggtt tcactttaag aatataattgt ttctatcaca attttttttt ttacagctgt	2100
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127	tgggctctgc agtggagggtt gtggggggaaa gggagggttgc tccaggacac tgacctgtgt	2940
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154	gcg tcg tgg gcg cgg ggc ggc ccg ccg cgc tgc acc tac acc ttc gtg	96
155	Ala Ser Trp Ala Arg Ala Gly Ala Pro Arg Cys Thr Tyr Thr Phe Val	
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158	ctg ccc ccg cag aag ttc acg ggc gct gtg tgc tgg agc ggc ccc gca	
159	Leu Pro Pro Gln Lys Phe Thr Gly Ala Val Cys Trp Ser Gly Pro Ala	
160	15 20 25	

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162	tcc	acg	cg	g	cg	ac	g	cc	g	cc	a	ac	g	cc	ac	g	ct	g	cg	g	cg	192
163	Ser	Thr	Arg	Ala	Thr	Pro	Glu	Ala	Ala	Asn	Ala	Ser	Glu	Leu	Ala	Ala						
164	30					35								40								
166	ctg	cg	at	g	tc	gg	cg	ca	g	ag	g	ag	ct	t	ta	cg	g	ag	ct	g	ag	240
167	Leu	Arg	Met	Arg	Val	Gly	Arg	His	Glu	Glu	Leu	Leu	Arg	Glu	Leu	Gln						
168	45					50								55							60	
170	agg	ct	g	cg	g	cc	g	ac	gg	cc	gt	g	cc	g	ag	gt	cg	g	cg	ct	288	
171	Arg	Leu	Ala	Ala	Ala	Asp	Gly	Ala	Val	Ala	Gly	Glu	Val	Arg	Ala	Leu						
172						65							70							75		
174	cgc	aag	gag	ag	cg	gg	ct	ag	cg	cg	ct	gg	ca	tg	tc	cg	g	cg	cg	cg	336	
175	Arg	Lys	Glu	Ser	Arg	Gly	Leu	Ser	Ala	Arg	Leu	Gly	Gln	Leu	Arg	Ala						
176						80							85							90		
178	cag	ct	g	ca	g	ag	cg	gg	cc	gg	cg	gg	cg	gg	g	at	ct	cg	gt	ct	384	
179	Gln	Leu	Gln	His	Glu	Ala	Gly	Pro	Gly	Ala	Gly	Pro	Gly	Ala	Asp	Leu						
180						95							100							105		
182	gg	gc	g	ag	cc	g	cg	gg	ct	g	cg	ct	gg	g	ag	cg	gt	ct	gt	ct	432	
183	Gly	Ala	Glu	Pro	Ala	Ala	Ala	Leu	Ala	Leu	Leu	Gly	Glu	Arg	Val	Leu						
184						110							115							120		
186	aa	gc	tcc	gc	g	ag	gt	ca	cg	ca	gc	cc	cg	tt	cc	ca	ca	cg	ct	480		
187	Asn	Ala	Ser	Ala	Glu	Ala	Gln	Arg	Ala	Ala	Arg	Phe	His	Gln	Leu							
188	125					130							135							140		
190	gac	gt	aag	tt	cg	g	ag	ct	g	cg	ca	ct	gt	cc	ac	ca	ca	ag	ag	528		
191	Asp	Val	Lys	Phe	Arg	Glu	Leu	Ala	Gln	Leu	Val	Thr	Gln	Gln	Ser	Ser						
192						145							150							155		
194	ct	at	gc	cg	ct	g	ag	cg	tc	cc	gg	tt	cc	ca	ca	cg	cg	gg	gg	cg	576	
195	Leu	Ile	Ala	Arg	Leu	Glu	Arg	Leu	Cys	Pro	Gly	Gly	Ala	Gly	Gly	Gln						
196						160							165							170		
198	cag	ca	gt	ct	cc	cc	ca	cc	ct	gt	cc	ct	gt	gt	cc	gt	cg	gt	ct	624		
199	Gln	Gln	Val	Leu	Pro	Pro	Pro	Leu	Val	Pro	Val	Val	Pro	Val	Arg							
200						175							180							185		
202	ct	tg	gt	ag	ac	ca	gt	gac	ac	at	gg	at	tg	g	cc	ca	gc	cc	ca	672		
203	Leu	Val	Gly	Ser	Thr	Ser	Asp	Thr	Ser	Arg	Met	Leu	Asp	Pro	Ala	Pro						
204						190							195							200		
206	ga	cc	ca	ga	ca	cc	ca	cc	at	tg	gt	ct	720									
207	Glu	Pro	Gln	Arg	Asp	Gln	Thr	Gln	Arg	Gln	Gln	Glu	Pro	Met	Ala	Ser						
208	205					210							215							220		
210	cc	at	tg	ca	gg	ca	ct	g	cg	cc	cc	ac	a	ag	c	ct	gt	gg	cc	768		
211	Pro	Met	Pro	Ala	Gly	His	Pro	Ala	Val	Pro	Thr	Lys	Pro	Val	Gly	Pro						
212						225							230							235		
214	tgg	ca	g	at	tg	g	ca	g	cc	ca	gg	cc	at	tg	gt	ct	tg	tt	tg	tt	816	
215	Trp	Gln	Asp	Cys	Ala	Glu	Ala	Arg	Gln	Ala	Gly	His	Glu	Gln	Ser	Gly						
216						240							245							250		
218	gt	tg	at	g	ca	gt	gg	cg	ct	ca	gt	tg	tca	gt	tg	tg	tg	tg	tg	tg	864	
219	Val	Tyr	Glu	Leu	Arg	Val	Gly	Arg	His	Val	Val	Ser	Val	Trp	Cys	Glu						
220						255							260							265		
222	cag	ca	ct	g	ag	gg	gg	gc	tgg	act	gt	at	c	ag	cg	ag	ca	at	tg	tt	912	
223	Gln	Gln	Leu	Glu	Gly	Gly	Gly	T	rg	Th	Val	Ile	Gln	Arg	Arg	Gln	Asp					
224						270							275							280		
226	gg	t	ca	gt	cc	a	cc	tt	cc	ac	cc	tgg	ca	g	ca	ca	t	tg	tg	tt	960	

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231	Gly	Arg	Pro	Asp	Gly	Glu	Tyr	Trp	Leu	Gly	Leu	Glu	Pro	Val	Tyr	Gln	
232									305		310				315		
234	ctg	acc	agc	cgt	ggg	gac	cat	gag	ctg	ctg	gtt	ctc	ctg	gag	gac	tgg	1056
235	Leu	Thr	Ser	Arg	Gly	Asp	His	Glu	Leu	Leu	Val	Leu	Leu	Glu	Asp	Trp	
236									320		325				330		
238	ggg	ggc	cgt	gga	gca	cgt	gcc	cac	tat	gat	ggc	ttc	tcc	ctg	gaa	ccc	1104
239	Gly	Gly	Gly	Ala	Arg	Ala	His	Tyr	Asp	Gly	Phe	Ser	Leu	Glu	Pro		
240									335		340				345		
242	gag	agc	gac	cac	tac	cgc	ctg	cg	ctt	ggc	cag	tac	cat	ggt	gat	gct	1152
243	Glu	Ser	Asp	His	Tyr	Arg	Leu	Arg	Leu	Gly	Gln	Tyr	His	Gly	Asp	Ala	
244									350		355				360		
246	gga	gac	tct	ttt	tcc	tgg	cac	aat	gac	aag	ccc	ttc	agc	acc	gtg	gat	1200
247	Gly	Asp	Ser	Leu	Ser	Trp	His	Asn	Asp	Lys	Pro	Phe	Ser	Thr	Val	Asp	
248									365		370				375		
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251	Arg	Asp	Arg	Asp	Ser	Tyr	Ser	Gly	Asn	Cys	Ala	Leu	Tyr	Gln	Arg	Gly	
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254	ggc	tgg	tgg	tac	cat	gcc	tgt	gcc	cac	tcc	aac	ctc	aac	ggt	gtg	tgg	1296
255	Gly	Trp	Trp	Tyr	His	Ala	Cys	Ala	His	Ser	Asn	Leu	Asn	Gly	Val	Trp	
256									400		405				410		
258	cac	cac	ggc	ggc	cac	tac	cga	agc	cgc	tac	cag	gat	ggt	gtc	tac	tgg	1344
259	His	His	Gly	Gly	His	Tyr	Arg	Ser	Arg	Tyr	Gln	Asp	Gly	Val	Tyr	Trp	
260									415		420				425		
262	gct	gag	ttt	cgt	ggt	ggg	gca	tat	tct	ctc	agg	aag	gcc	gcc	atg	ctc	1392
263	Ala	Glu	Phe	Arg	Gly	Gly	Ala	Tyr	Ser	Leu	Arg	Lys	Ala	Ala	Met	Leu	
264									430		435				440		
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 303 80 85 90
 306 Gln Leu Gln His Glu Ala Gly Pro Gly Ala Gly Pro Gly Ala Asp Leu
 307 95 100 105
 310 Gly Ala Glu Pro Ala Ala Ala Leu Ala Leu Leu Gly Glu Arg Val Leu
 311 110 115 120
 314 Asn Ala Ser Ala Glu Ala Gln Arg Ala Ala Arg Phe His Gln Leu
 315 125 130 135 140
 318 Asp Val Lys Phe Arg Glu Leu Ala Gln Leu Val Thr Gln Gln Ser Ser
 319 145 150 155
 322 Leu Ile Ala Arg Leu Glu Arg Leu Cys Pro Gly Gly Ala Gly Gln
 323 160 165 170
 326 Gln Gln Val Leu Pro Pro Pro Leu Val Pro Val Val Pro Val Arg
 327 175 180 185
 330 Leu Val Gly Ser Thr Ser Asp Thr Ser Arg Met Leu Asp Pro Ala Pro
 331 190 195 200
 334 Glu Pro Gln Arg Asp Gln Thr Gln Arg Gln Gln Glu Pro Met Ala Ser
 335 205 210 215 220
 338 Pro Met Pro Ala Gly His Pro Ala Val Pro Thr Lys Pro Val Gly Pro
 339 225 230 235
 342 Trp Gln Asp Cys Ala Glu Ala Arg Gln Ala Gly His Glu Gln Ser Gly
 343 240 245 250
 346 Val Tyr Glu Leu Arg Val Gly Arg His Val Val Ser Val Trp Cys Glu
 347 255 260 265
 350 Gln Gln Leu Glu Gly Gly Trp Thr Val Ile Gln Arg Arg Gln Asp
 351 270 275 280
 354 Gly Ser Val Asn Phe Phe Thr Thr Trp Gln His Tyr Lys Ala Gly Phe
 355 285 290 295 300
 358 Gly Arg Pro Asp Gly Glu Tyr Trp Leu Gly Leu Glu Pro Val Tyr Gln
 359 305 310 315
 362 Leu Thr Ser Arg Gly Asp His Glu Leu Leu Val Leu Leu Glu Asp Trp
 363 320 325 330
 366 Gly Gly Arg Gly Ala Arg Ala His Tyr Asp Gly Phe Ser Leu Glu Pro
 367 335 340 345
 370 Glu Ser Asp His Tyr Arg Leu Arg Leu Gly Gln Tyr His Gly Asp Ala
 371 350 355 360
 374 Gly Asp Ser Leu Ser Trp His Asn Asp Lys Pro Phe Ser Thr Val Asp
 375 365 370 375 380
 378 Arg Asp Arg Asp Ser Tyr Ser Gly Asn Cys Ala Leu Tyr Gln Arg Gly
 379 385 390 395
 382 Gly Trp Trp Tyr His Ala Cys Ala His Ser Asn Leu Asn Gly Val Trp
 383 400 405 410
 386 His His Gly Gly His Tyr Arg Ser Arg Tyr Gln Asp Gly Val Tyr Trp
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VERIFICATION SUMMARY

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L:14 M:271 C: Current Filing Date differs, Replaced Current Filing Date